

LINE IDENTIFICATIONS IN SILICON STARS IN THE VISUAL REGION

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We have analysed a group of four silicon stars (HD 29305= α Dor, HD 54118, HD 73340 and HD 133880) and the normal AIV star HD 135382, on the basis of Bosque Alegre spectrograms (42 Å/mm) in the red region (λλ4800-6700). The purpose of the work was to provide an identification list of all lines which could be distinguished in at least two silicon stars. We derived wavelenghts accurate to 0,2 Å for 350 lines. The results are:

- 1) The SiII lines are the strongest visible lines in the red region (especially λλ5056, 6347 and 6371). These lines can be used as finding criteria for the silicon stars.
- 2) In the silicon stars lines pertaining to the following elements were found: FeI,II; CrI,II; VII; TiI; SiII; CaI; N I. The presence of Ti II, Al II, Eu II, Ne I, O I and S II is doubtful.
- 3) In three of the stars - α Dor, HD 73340, 133880- which show the unidentified λ4200 line, ten more medium-strong lines appear which have found so far no satisfactory identification.

The complete work will be published elsewhere.